



on the header for the traffic cell, to determine an address in a switch memory for storing the traffic cell based on the type, and to store the traffic cell in the switch memory at the address.

25. (New) The system of Claim 24, the software comprising a switch interface and a switch controller, the software further operable to receive the frame at the switch interface, to extract the header from the time slots at the switch interface, to pass the header to the switch controller, and to determine the address at the switch controller based on the header.

26. (New) The system of Claim 25, the software further operable to pass a traffic cell from the switch interface to the switch memory, to pass the address from the switch controller to the switch memory, and to associate the address with the traffic cell at the switch memory.

27. (New) The system of Claim 26, the software further operable to operate the switch interface, switch controller, and switch memory at a synchronized frame pulse.

28. (New) The system of Claim 24, wherein the switch memory comprises a plurality of time division multiplex (TDM) memory slots and a plurality of asynchronous transfer mode (ATM) queues associated with output ports, the software further operable to determine an address of an ATM queue in the switch memory for storing a traffic cell in response to determining the traffic cell is of an ATM type.

29. (New) The system of Claim 28, the software further operable to determine an address of a TDM memory slot in the switch memory for storing a traffic cell in response to determining the traffic cell is of a TDM type.

30. (New) The system of Claim 24, the software further operable to receive a frame from each of a plurality of point-to-point links of a bus, each frame comprising a plurality of time slots.

31. (New) The system of Claim 24, the software further operable to transmit an egress frame comprising a plurality of egress time slots that are each operable to transport a traffic cell, to determine an address in the switch memory storing a traffic cell for transport in an egress time slot, and to write the traffic cell at the address in the switch memory to the egress time slot for transmission in the egress frame.

32. (New) The system of Claim 25, the software comprising:

the switch interface operable to transmit an egress frame comprising a plurality of egress time slots that are each operable to transport a traffic cell;

the switch controller operable to determine an address in the switch memory storing a traffic cell for transport in an egress time slot and to provide the address to the switch memory; and

the switch memory operable to write the traffic cell at the address in the switch memory to the egress time slot for transmission in the egress frame.